

Date: Sat, 18 Sep 93 15:08:52 PDT
From: Info-Hams Mailing List and Newsgroup <info-hams@ucsd.edu>
Errors-To: Info-Hams-Errors@UCSD.Edu
Reply-To: Info-Hams@UCSD.Edu
Precedence: Bulk
Subject: Info-Hams Digest V93 #1111
To: Info-Hams

Info-Hams Digest Sat, 18 Sep 93 Volume 93 : Issue 1111

Today's Topics:

 Daily Solar Geophysical Data Broadcast for 16 September
 Ham-Univ Mailing List for College Amateur Radio Clubs
 Mods. Wanted
 Neighborhood watch groups
 Question about ni-cads (was Re: need expert info on nicads.)
 RS HTX202 warning
 White Noise Generator
 Who Wrote Scratchi? (3 msgs)
 writing speed (2 msgs)

Send Replies or notes for publication to: <Info-Hams@UCSD.Edu>
Send subscription requests to: <Info-Hams-REQUEST@UCSD.Edu>
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Info-Hams Digest are available
(by FTP only) from UCSD.Edu in directory "mailarchives/info-hams".

We trust that readers are intelligent enough to realize that all text
herein consists of personal comments and does not represent the official
policies or positions of any party. Your mileage may vary. So there.

Date: 18 Sep 93 20:14:23 GMT
From: news-mail-gateway@ucsd.edu
Subject: Daily Solar Geophysical Data Broadcast for 16 September
To: info-hams@ucsd.edu

!!BEGIN!! (1.0) S.T.D. Solar Geophysical Data Broadcast for DAY 259, 09/16/93
10.7 FLUX=088.0 90-AVG=095 SSN=037 BKI=1112 2221 BAI=005
BGND-XRAY=A5.6 FLU1=8.9E+05 FLU10=1.3E+04 PKI=2222 3221 PAI=007
 BOU-DEV=006,005,007,011,019,014,010,005 DEV-AVG=009 NT SWF=00:000
 XRAY-MAX= C6.3 @ 1750UT XRAY-MIN= A3.5 @ 0801UT XRAY-AVG= B1.7
NEUTN-MAX= +003% @ 2320UT NEUTN-MIN= -001% @ 1855UT NEUTN-AVG= +0.6%
 PCA-MAX= +0.1DB @ 1915UT PCA-MIN= -0.2DB @ 2130UT PCA-AVG= +0.0DB
BOUTF-MAX=55366NT @ 1348UT BOUTF-MIN=55337NT @ 1753UT BOUTF-AVG=55358NT
GOES7-MAX=P:+000NT@ 0000UT GOES7-MIN=N:+000NT@ 0000UT G7-AVG=+077,+000,+000

GOES6-MAX=P:+110NT@ 2051UT GOES6-MIN=N:-066NT@ 1321UT G6-AVG=+096,-020,-044
FLUXFCST=STD:090,090,090;SESC:090,090,090 BAI/PAI-FCST=005,005,005/012,010,010
KFCST=2223 2211 2223 2211 27DAY-AP=007,007 27DAY-KP=3233 1221 2233 2221
WARNINGS=
ALERTS=
!!END-DATA!!

NOTE: The Effective Sunspot Number for 15 SEP 93 was 35.0.
The Full Kp Indices for 15 SEP 93 are: 4- 5- 4o 3o 3- 2- 2o 3-

Date: Mon, 13 Sep 1993 17:30:34 GMT
From: unix.sri.com!headwall.Stanford.EDU!agate!howland.reston.ans.net!usc!
yeshua.marcam.com!zip.eecs.umich.edu!destroyer!nntp.cs.ubc.ca!alberta!adec23!
ve6mgs!usenet@hplabs.hpl.hp.com
Subject: Ham-Univ Mailing List for College Amateur Radio Clubs
To: info-hams@ucsd.edu

With the start of a new academic year, and with increasing activity on the list, it's probably a good time to again publicize the existence of the Ham-Univ mailing list.

In existence for at least several years now (and hosted on 3 different listserver sites :-), the Ham-Univ mailing list is a forum for all things related to college and university amateur radio clubs. General amateur radio discussion is more appropriate for the rec.radio.amateur Usenet newsgroups.

Anyone who is a member of a college or university amateur radio club, or who has a sincere interest in the subject, is welcome. The forum is ideal for topics like:

- Why should students be interested in amateur radio?
- How do I start a club at my school?
- How do I revitalize an inactive club?
- How do I raise funds for equipment and activities?
- How do we find room on campus for a station and antennas?
- How do I deal with campus regulations that restrict possession and use of radio equipment?
- How can the American Radio Relay League (ARRL) assist my club?

- When is the college net?

To subscribe, send E-mail to listserv@listserver.njit.edu. In the body of the message, write:

SUBSCRIBE HAM-UNIV

and you should get an acknowledgement very shortly.

To post to the list, send mail to ham-univ@listserver.njit.edu. To unsubscribe, send mail to [listserv](mailto:listserv@listserver.njit.edu) again and put:

UNSUBSCRIBE HAM-UNIV

in the body.

Problems that cannot be solved through the automated listserver should be brought to the attention of the list owner, Chris Peckham WG2W (cdp@hertz.njit.edu).

Remember to use ham-univ only for message posts and to keep the listserv updated with respect to your E-mail address (or lack thereof) to save work for those dedicated individuals at the New Jersey Institute of Technology who have extended this service.

Hope to see you on the list soon!

73, Paul W. Schleck, KD3FU

pschleck@unomaha.edu

Date: 17 Sep 1993 06:43:25 GMT
From: dog.ee.lbl.gov!agate!resonance.EECS.Berkeley.EDU!acollins@network.ucsd.edu
Subject: Mods. Wanted
To: info-hams@ucsd.edu

In article <27bjmb\$9pd@bigboote.wpi.edu>,
Brent Hiller <bhiller@parker.WPI.EDU> wrote:
>I'm looking for modifications for the Kenwood TM-732A and the TM-241A.
>Any help would be greatly appreciated.

Try ftp to [ftp.geo.brown.edu](ftp://ftp.geo.brown.edu). They have a large collection of mods for lots of brands (I only have a Yaesu, so I don't know about the Kenwood selections personally, though). The directory is /pub/hamradio/rigmods, if memory serves.

Hope it helps -

Andy

```
--  
//-----  
//  Andy Collins -- KC6YEY -- acollins@resonance.EECS.Berkeley.EDU  
//          Proud owner and operator of OS/2 2.1  
//-----
```

Date: Thu, 16 Sep 93 20:35:56 CDT
From: dog.ee.lbl.gov!agate!howland.reston.ans.net!usc!elroy.jpl.nasa.gov!swrinde!
menudo.uh.edu!jpunix!unkaphaed!amanda!robert@network.ucsd.edu
Subject: Neighborhood watch groups
To: info-hams@ucsd.edu

dparker@netcom.com (Dave Parker) writes:

```
> >>: Or...establish your OWN repeater.  
> >  
> >>OH? On what freqs? There are none left that won't QRM existing ones.  
> >  
> >I don't think a repeater is needed. Most neighborhood watch groups only cove  
> >an area of less than 1/2 mile in extent, so HT's should work fine, and if  
> >needed, a base station could handle relays.  
>  
> How about one of those simplex repeaters? Would this be good/bad idea?
```

The problem with the "store and forward" (simplex) repeaters is that they're difficult and time-consuming to use. Given the small area of operation, and your desire to stay clear of established machines, I have a suggestion: Why not have one person as the designated "net control." He (or she) would be at a central base station, and could receive reports and give instructions to the patrol units (on handhelds). In order to increase privacy from eavesdroppers, you could conduct your activities of split frequencies, where the portables transmit on one, and the base on the other.

--Robert

Date: 16 Sep 1993 18:49:24 GMT
From: dog.ee.lbl.gov!agate!spool.mu.edu!wupost!news.miami.edu!usenet.ufl.edu!
eng.ufl.edu!helios.tcad.ee.ufl.edu!thoman@network.ucsd.edu
Subject: Question about ni-cads (was Re: need expert info on nicads.)

To: info-hams@ucsd.edu

In article <1993Sep15.210000.9418@VFL.Paramax.COM>, rossi@VFL.Paramax.COM (Pete Rossi) writes:

|> I have a question about ni-cads....

|>

|>

|> Why has there never been a standard developed for ni-cad battery packs?

|>

|> I can't figure out why every manufacturer needs to use his own custom,
|> proprietary, ni-cad battery pack.

Because then they get to charge their own custom, proprietary price for it. If it becomes a standard part the price drops due to competition and the part becomes a commodity.

I have been involved in exactly this discussion on a past design, and won the "use a standard 9 volt" argument only because management had sufficient concern for the customer to give up the juicy profits available from a proprietary battery.

Greg Thoman: The opinions expressed herein are mine alone, and I am solely irresponsible for them.

Date: Sat, 18 Sep 1993 21:47:36 GMT

From: library.ucla.edu!agate!spool.mu.edu!think.com!yale.edu!cs.yale.edu!wsub.ctstateu.edu!ritterbus001@network.ucsd.edu

Subject: RS HTX202 warning

To: info-hams@ucsd.edu

A friend in my daughter's club warned that the plastic loop on the side of the HTX202 where you fasten the wrist-stap ring had broken off of his, causing the HT to fall. Fortunately, he was on a carpeted floor, so no further damage resulted.

He suggested attaching the wrist strap through one of the holes in the belt clip, which I promptly did. It's a trivial problem, but I wouldn't want it to happen on a concrete floor :-(

73s

Jim

Date: Sat, 18 Sep 1993 02:21:27 GMT

From: news.service.uci.edu!biivax.dp.beckman.com!mail.beckman.com!

murashiea@network.ucsd.edu
Subject: White Noise Generator
To: info-hams@ucsd.edu

Check out the latest issue of Nuts and Volts Magazine. It has a construction project of a pink noise generator. The front end of the pink noise generator is a white noise source. I built the circuit, and it worked great!

Ed Murashie

Ed Murashie US Mail : Beckman Instruments Inc.
phone: (714) 993-8895 Diagnostic System Group
fax: (714) 961-3759 200 S. Kraemer Blvd W-361
Internet: murashiea@mail.beckman.com Brea, Ca 92621

Date: Thu, 16 Sep 1993 19:38:52 GMT
From: dog.ee.lbl.gov!agate!spool.mu.edu!sdd.hp.com!col.hp.com!news.dtc.hp.com!
srngenprp!donrm@network.ucsd.edu
Subject: Who Wrote Scratchi?
To: info-hams@ucsd.edu

Does anyone know who wrote the "SCRATCHI" column in the old CQ magazine? (This was back in the days when Wayne Green was editor).

Is there even anyone out there old enough to even remember Scratchi?

For the uninitiated, Hashafisti Scratchi was a fictitious character that was always coming up with weird solutions to ham radio problems - such as the time Scratchi found that the white dividing line on roads was slightly conductive, so described a way of feeding it on 75 meter mobile, with highly variable results.

I always thought Wayne himself wrote it, but others disagree. Anyone out there know?

Don Montgomery, K6LTS
donrm@sr.hp.com

Date: Sat, 18 Sep 1993 14:56:03 GMT
From: news.cerf.net!pagesat!indirect.com!jbromley@network.ucsd.edu
Subject: Who Wrote Scratchi?
To: info-hams@ucsd.edu

In article <jchappel.43.748281774@sander.lockheed.com>
jchappel@sander.lockheed.com (Joel Chappell, KC1SG writes:

>***** Explain "fist" to the No-Code kiddies out there in radioland*****

Heh, heh. Ask this question over on alt.sex.bondage and see what
answer you get. And maybe an offer of a demonstration. ;-)

-- W5GYJ

--

Jim Bromley, W5GYJ All opinions strictly my own.
5128 N. 69th Avenue tel: 602-848-8711
Glendale, AZ 85303 Internet: jlbromley@indirect.com

Date: 18 Sep 93 08:35:51 EST
From: sdd.hp.com!spool.mu.edu!nigel.msen.com!ilium!sycom!jh25s56@network.ucsd.edu
Subject: Who Wrote Scratchi?
To: info-hams@ucsd.edu

Can't remember what the fellow's name was but he also wrote a series in
Popular Electronics, something like Tom and Jerry's adventures in radio.

--

Jim Harvey | "Just because you already bought your groceries
18538 Inkster | doesn't mean you can't go back in the store and
Redford, Mi | look at the tomatoes." Harvey's principle #4
48240 | jh25s56@sycom.mi.org

Date: Sat, 18 Sep 1993 09:54:53 GMT
From: library.ucla.edu!europa.eng.gtefsd.com!howland.reston.ans.net!
sol.ctr.columbia.edu!news.kei.com!news.oc.com!NewsWatcher!user@network.ucsd.edu
Subject: writing speed
To: info-hams@ucsd.edu

In article <1993Sep18.131127.23374@ke4zv.atl.ga.us>, gary@ke4zv.atl.ga.us
(Gary Coffman) wrote:

>> I found out something interesting the other day. I had to get an
> important letter out that morning and found out my laser printer
> had died. So I decided to write the letter longhand. I couldn't
> do it. I know what the letters are supposed to look like, but I
> couldn't make my hand do them. I could still block print, but not
> write cursive. So I pulled out the tools and fixed the laser printer.

> I guess I should practice writing longhand again for the day I
> *can't* immediately fix the printer. 1/2 :-)
>
> Gary

That's interesting. I'm mildly dyslexic (is that spelled right :-).
I've NEVER been able to "hand write" - printing is the best I can do.
Passed my 13 wpm with printing back in 1972. Interestingly enough I can
type pretty reasonable speed (I tell people I can type 300 wpm, but have
to backspace 275 of that :-)

===== insert usual disclaimers here =====

Bob Wier, East Texas State U., Commerce, Texas
wier@merlin.etsu.edu (watch for address change)

Date: Sat, 18 Sep 1993 20:55:35 GMT
From: nevada.edu!news.unomaha.edu!cwis!pschleck@uunet.uu.net
Subject: writing speed
To: info-hams@ucsd.edu

In <1993Sep18.131127.23374@ke4zv.atl.ga.us> gary@ke4zv.atl.ga.us (Gary Coffman)
writes:

>I found out something interesting the other day. I had to get an
>important letter out that morning and found out my laser printer
>had died. So I decided to write the letter longhand. I couldn't
>do it. I know what the letters are supposed to look like, but I
>couldn't make my hand do them. I could still block print, but not
>write cursive. So I pulled out the tools and fixed the laser printer.
>I guess I should practice writing longhand again for the day I
>*can't* immediately fix the printer. 1/2 :-)

>Gary

Damn man, how do you sign checks? Oh, I know, you've got that
CheckFree software :-).

I try and write some longhand now and then, usually using something from
my collection of fountain pens. Keeps my writing as good as my CW.

73, Paul, KD3FU

pschleck@unomaha.edu

Date: 18 Sep 93 04:11:56 GMT
From: netcomsv!netcom.com!wa2ise@decwrl.dec.com
To: info-hams@ucsd.edu

References <willmore.748222237@trempllo.gis.iastate.edu>,
<27cf77\$7d1@bigguy.eng.ufl.edu>, <1993Sep17.141022.24473@mprgate.mpr.ca>ne
Subject : Re: White Noise Generator

You could just tune your FM tuner to an empty (no station) spot on the dial and allow the hiss to play thru the amp to the speakers. The FM deemphasis will roll off the highs a bit. It sounds something like white noise. You probably already have the required hardware, so this is a zero cost solution.

Date: 17 Sep 1993 13:48:23 GMT
From: sdd.hp.com!vixen.cso.uiuc.edu!howland.reston.ans.net!gatech!usenet.ufl.edu!eng.ufl.edu!helios.tcad.ee.ufl.edu!thoman@network.ucsd.edu
To: info-hams@ucsd.edu

References <CDDADu.3qF@cnsnews.Colorado.EDU>,
<1993Sep15.224024.9374@ke4zv.atl.ga.us>,
<willmore.748222237@trempllo.gis.iastate.edu>
Subject : Re: need expert info on nicads.

In article <willmore.748222237@trempllo.gis.iastate.edu>, willmore@iastate.edu (David Willmore) writes:

|> gary@ke4zv.atl.ga.us (Gary Coffman) writes:
|> >This isn't always safe advice. I had a battery rupture that was on a
|> >45 ma trickle for a year. Overnight is probably fine, but forever is
|> >a bit too long to keep a Nicad charging. Even at 45 ma they do eventually
|> >dry out and fail. I've had HT packs sitting in the trickle charger for
|> >a couple of weeks that didn't have any capacity when I tried to use
|> >them. And they were relatively new packs too. Unlike lead acid cells
|> >which will quickly die if not kept charged, Nicads are best stored
|> >discharged. If stored charged, they usually lose about 10% of their
|> >charge per month. I wouldn't trickle at a higher rate than that if
|> >I were going to leave them on charge forever. Note that that's not
|> >C/10, that's C/720. Any time you overcharge a Nicad, you cause
|> >outgassing, however slight, and prolonged overcharging, even at a
|> >trickle rate, will damage the battery.
|>
|> I've got a little problem with your assertion that NiCd's should be
|> stored discharged. If you store a NiCd charged, the little crystal
|> "dendrites" that naturally form internally get blown to bits as soon
|> as they form. If you don't keep the battery charged, these little

|> dendrites will continue to form--shorting the battery and killing it.
|>
|> Am I misunderstanding what you have said or do we actually have a
|> disagreement?

I second the disagreement. NiCds should be fully charged before storage and should not be stored discharged.

Greg Thoman: The opinions expressed herein are mine alone, and I am
solely irresponsible for them.

Date: 16 Sep 1993 19:00:13 GMT
From: dog.ee.lbl.gov!agate!howland.reston.ans.net!wupost!news.miami.edu!
usenet.ufl.edu!eng.ufl.edu!helios.tcad.ee.ufl.edu!thoman@network.ucsd.edu
To: info-hams@ucsd.edu

References <m9c3n8INNar@exodus.Eng.Sun.COM>, <277h5f\$5j1@bigguy.eng.ufl.edu>,
<6851@gos.ukc.ac.uk>e
Subject : Re: need expert info on nicads.

In article <6851@gos.ukc.ac.uk>, mcw@ukc.ac.uk (Mark Wheadon) writes:

|> This effect does exist - I know because I've observed it.
|>
|> I bought my RC gear a year-or-so before I was finally in a position to
|> get back into flying, and during that period I would occasionally give
|> the batteries a top-up charge. Before using the gear in anger I bought
|> a cyclor - it discharges the pack to a safe low level, lighting an LED
|> bar graph as it goes, and then recharges the pack.
|>
|> On the first cycle (after an overnight trickle charge) the RX battery
|> managed something like 60% of its stated capacity, on the second it
|> managed (I think - this was some time ago) 80%, and only on the third
|> attempt did it manage 100%. The TX battery behaved in a similar manner.
|>
|> So yes, the effect is real - a fact that I thought was generally
|> accepted nowadays...
|> ----

Have I misread your post? It sounds like you have very precisely
described discharge voltage depression, induced by overcharging. This
is not memory effect.

Greg Thoman: The opinions expressed herein are mine alone, and I am
solely irresponsible for them.

Date: 16 Sep 1993 18:55:56 GMT
From: dog.ee.lbl.gov!agate!spool.mu.edu!wupost!news.miami.edu!usenet.ufl.edu!
eng.ufl.edu!helios.tcad.ee.ufl.edu!thoman@network.ucsd.edu
To: info-hams@ucsd.edu

References <277h5f\$5j1@bigguy.eng.ufl.edu>,
<1993Sep15.174735.2013@ObjecTime.on.ca>, <1993Sep15.225250.9510@ke4zv.atl.ga.us>~p
Subject : Re: need expert info on nicads.

In article <1993Sep15.225250.9510@ke4zv.atl.ga.us>, gary@ke4zv.atl.ga.us (Gary
Coffman) writes:

|> Yep, the official name for this condition is "voltage depression".

Discharge voltage depression is caused by overcharging. It is
not memory effect.

Greg Thoman: The opinions expressed herein are mine alone, and I am
solely irresponsible for them.

Date: Fri, 17 Sep 1993 00:18:33 GMT
From: dog.ee.lbl.gov!agate!usenet.ins.cwru.edu!magnus.acs.ohio-state.edu!csn!
server!georgen@network.ucsd.edu
To: info-hams@ucsd.edu

References <270niu\$53j@news.delphi.com>, <CDBH7B.23s@stortek.com>,
<7968.2c9753d1@hayes.com>.edu
Subject : Re: CW and DSP

In article <7968.2c9753d1@hayes.com> bcoleman@hayes.com (Bill Coleman) writes:
>In article <CDBH7B.23s@stortek.com>, georgen@stortek.com (George Noyes x5698)
writes:

>>

>> CW - 100 Hz and 300 Hz BW work as advertised. Ringing is only marginally
>> better than most crystal filters (yes, sharp filters ring, even dsp units
>> see basic filter theory 101 - linear phase doesn't say anything about ringing).

>

>I thought only feedback-type filters could ring. (ie IIR filters) I don't
>see how an FIR filter could ring, and they have linear phase response.

>

>Of course, it takes a lot more "taps" in an FIR filter to get the job done
>compared to an IIR filter. And processing power.

>

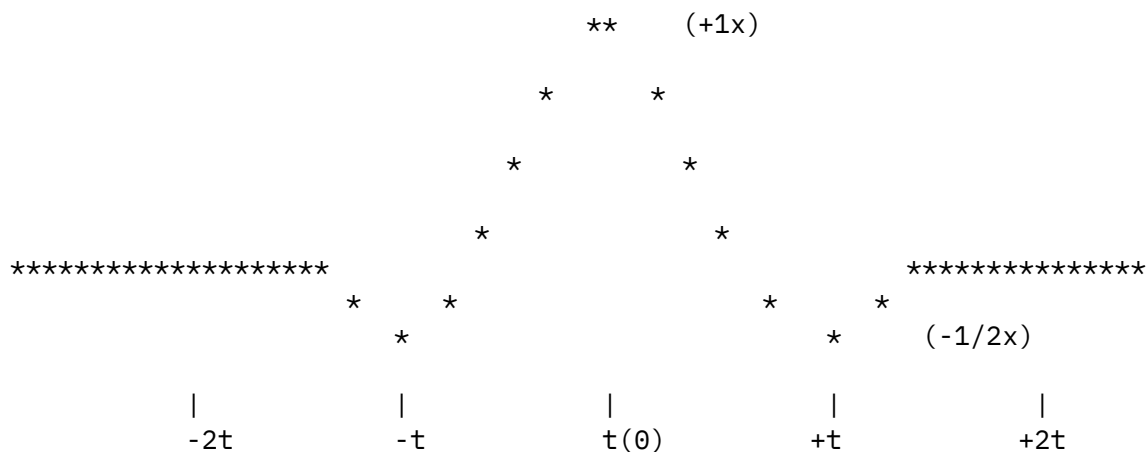
>--

>Bill Coleman, AA4LR

! CIS: 76067,2327

AppleLink: D1958

As mentioned in my previous post, perhaps "ring" is a poor choice of words, for which I have no other way to describe it... FIRs will not oscillate, of course, but think for the moment of an FIR filter (ie raised-cosine), with equalizer weights of $-1/2$, $+1$, and $-1/2$ (summed analog domain) and one applies a step function into the filter, band limit to the first significant frequency band of the FIR filter, one can obtain the following response with the defined FIR taps (example chosen for simplicity):
(ya, this is a bandpass filter)



This isn't technically "ringing" but that's sure how my ear would interpret it....

A pure sine wave at the "tap delay" rate, will have minimal overshoot, But step functions (with similar results for impulses) will produce what looks like "ringing".

FYI Linear phase is implied by the response's time symmetry! Non-linear phase, aka: NON-constant group delay produce asymmetrical time domain signaling for a step or impulse response.

Note: if the sum of the area under the curve = 0 for then also implies a zero at dc.

Ah, imperfect life..... I leave it to the student to prove.....

73 George, W1XE email: georgen@redwood.stortek.com

Date: Thu, 16 Sep 1993 17:21:54 GMT
From: psinntp!sys1!unislcl!mgc@uunet.uu.net
To: info-hams@ucsd.edu

References <CDB1to.IDJ@wang.com>, <1993Sep14.210105.4653@unislcl.slc.unisys.com>,
<CDEyMC.HrG@wang.com>
Subject : Re: * MORSE CODE TABLE *

Dave Bushong (dbushong@wang.com) wrote:
: mgc@unislcl.slc.unisys.com (Marc Christensen) writes:

: >I see this argument over and over, but...
: >My brain has a hard time parsing "dahdididit", it is much easier for me
: >to read "-..."
: >NOW DON'T miss this point "THEY ARE BOTH PRONOUNCED dahdididit"

: Marc,

: How fast do you typically copy code? Many people who write dots and
: dashes have a plateau around 10 wpm.

I think the main problem with most of these persons is:
They remember Dash Dot Dot Dot.
They Hear Dah Di Di Dit.
They Translate to Dash Dot Dot Dot.
They Decode Dash Dot Dot Dot.
They miss the next letter.

I don't typically copy code. It has probably been 10 Years.

Marc Christensen

End of Info-Hams Digest V93 #1111
